

Weekly Report 1

Group Nr. 10

1 Weekly Progress

Accomplishment of the tasks have been carried out in a collaborative fashion through the live share feature of **Visual Studio Code**. Tasks were followingly;

- Data selection and extraction
- Feature point detection
- Correspondance matching of feature points
- Epipolar line calculation

2 Problems

Due to the low resolution images, the *SIFT* feature detector initially could only detect few feature points, which also did not correspond well to one another in the two images. Changing the contrast, edge threshold and the sigma parameter to more lenient values resulted in more detected feature points and better correspondences between them.

3 Results

Fig. 1 shows the feature points that were detected by the *SIFT* feature detector in the two images and the correspondences the *FLANN* matcher determined. Fig. 2 shows corresponding epipolar lines in the two images.

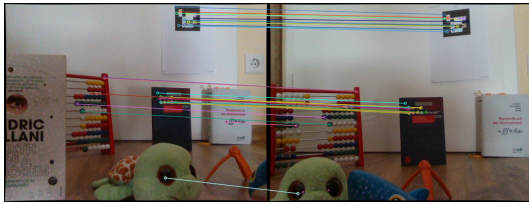


Figure 1: Feature point matches

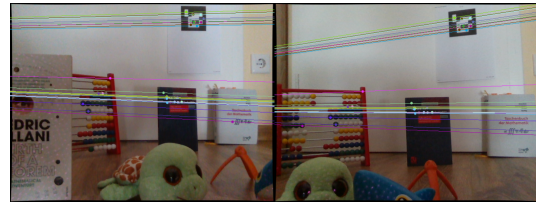


Figure 2: Epipolar lines

4 Plan

We are planning to reutilize the extracted feature points and correspondances with the aim of computing the disparity map of the two images in the next week.